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ABSTRACT

This state-of-the-practice report attempts to clarify the role of vocational education in job creation and development and to illustrate what part vocational educators can and are playing. Following an introduction is a chapter examining how states and local communities have gone about involving vocational education in job creation and development. Three models for implementing or coordinating job creation efforts--single state agency, multi-agency, local development--are described with examples provided. Three statewide and four local vocational education approaches for linking job creation programs with vocational education are briefly sketched and guidelines for other efforts are drawn from the examples provided. Chapter 3 examines the role of vocational education in economic development in both the public and private sector. How federal, state, and local governments have gone about the task of expanding job opportunities is reviewed, partly in terms of classic economic development theory and partly in terms of human resource development strategies. Chapter 4 discusses the role of vocational education planners and coordinators in the job creation effort. Input, process, and output variables are described. The last chapter forecasts the socioeconomic trends of the 1980s and charts the implications of these trends for vocational education and its part in job creation and development. (YLB)

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THE EMERGING ROLE OF VOCATIONAL EDUCATION IN JOB CREATION AND DEVELOPMENT

David S. Bushnell

American Vocational Association

Arlington, Virginia

May, 1980

The research reported herein was performed pursuant to a contract with the US Department of Education. Contractors undertaking such projects under Government sponsorship are encouraged to express freely their professional judgment in the conduct of the project. Points of view or opinions stated do not, therefore, necessarily represent official US Department of Education position or policy.

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ABSTRACT

Customized, industrial training programs, small business management training, cooperative education — all represent strategies by which vocational educators are aiding states and local communities in their efforts to preserve, expand and open up new jobs. This commitment represents a shift from the traditional role of providing a supply of qualified workers for the labor market to the demand side of the supply/demand equation.

Three state-wide job creation and development models are outlined and illustrations of vocational education's role in each are provided. How public and private organizations undertake to combine human and material resources with what results is then discussed. Attempts to evaluate vocational education's part in regional economic development programs are summarized and their implications traced.

The impact of existing federal agency programs is discussed. Those concerned primarily with minimizing the effects of cyclical unemployment are contrasted with those which focus on structural unemployment. The development of a region's human resources by means of vocational education programs and services is portrayed as one of several strategies available to states and local communities.

The report concludes with a forecast of vocational education's expanded role in job creation and development in the 80's.

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PREFACE

The State-of-the-Practice reported in the following pages is the first product from the Economic Development Project* which has been undertaken by the American Vocational Association under a contract with the U. S. Office of Vocational and Adult Education. The report is based on the review of literature, much of which exists only in the form of publicity materials, and perceptions of knowledgeable experts in the field of vocational education's role in support of economic development at the state and local level. Contributions of these experts (list in Appendix A), and of those who sent in materials for review from all over the country are recognized and highly appreciated.

During the second phase of the Project, an in-depth study of selected sites will be conducted in order to identify the factors that make economic development programs successful. Our focus, of course, will be vocational education programs at these sites and we will study their linkages with other agencies all working together to increase job opportunities and improve quality of life within their respective areas. Analysis of these studies will be published as a guide to promoting new linkages for economic development. In the third and final phase of the Project, we will provide technical assistance to states and communities to start new linkage programs. The State-of-the-Practice Report is a first step towards that objective.

Mr. David Bushnell of the American University is the principal author of the report with valuable insight and reviews provided by Dr. Ellen Carlos. Both deserve much credit for putting together a document which gives an overview of the State-of-the-Practice.

Krishan K. Paul
Project Director
Economic Development

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* The full title of the Project is "A Study to Identify and Promote Linkages between Vocational Education and Job Creation/Development."

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CHAPTER I

INTRODUCTION

Large cities and rural America today face a common enemy -- high unemployment. Large cities often have the jobs but lack people with the necessary skills; rural areas may have the people but often lack the jobs. Matching people and jobs has become the preoccupation of a number of state and municipal agencies. Faced with the challenge of maintaining and enhancing employment in their area, they do so by tapping a variety of vocational training and job creation strategies. Many of the agencies involved are struggling with the problems of inadequate funding, fragmented services, and jurisdictional disputes. The more complex the effort, the greater the need for establishing cooperative relationships. Examples of successful cooperation do exist -- some are built around the active involvement of vocational educators.

Traditionally, vocational education has been largely concerned with preparing youth and adults for employment. Its focus over the years has been on "creating a supply of job seekers."[1] More recently, however, vocational education's role has undergone a subtle transformation with skilled practitioners of the art now participating in community or statewide efforts to expand or maintain jobs. To expand or develop employment opportunities through collaboration with others puts those involved in a position to actively create and demand skills; formerly, business and labor leaders were regarded as the leaders. Moving from a reactive to a pro-active role in economic development requires an understanding of the interplay of social, political and economic forces which shape the job creation and development process. The primary purpose of this state-of-the-practice report will be an attempt to clarify that role and to illustrate what part vocational educators can and are playing. The report is written with those job developers

and creators in mind who lack an in-depth understanding of economic development theory but, who by virtue of their recently assumed responsibilities, need to know more about how their roles fit into the larger sphere of economic development activities. Of necessity, the theory to be communicated will be grounded in on-going programs selected because of their success in achieving a common goal -- the expansion or preservation of jobs.

Citations and capsulated descriptions of successful programs have been included to heighten the reader's understanding of how successful job creation programs are organized and operated. Marshalling evidence to support or refute the claim that vocational education can and is contributing to such programs should spur critics and supporters alike to a more informed discussion of the issues. Documenting successful experience hopefully will serve to cue new ideas among practitioners which should, in turn, contribute to the improvement of existing programs. In this way, the larger goal of initiating or strengthening job creation and development strategies will be served.

For the purposes of this report, job creation and development programs are defined as systematic attempts to expand employment opportunities or increase a worker's income through the recruitment of new business firms, promotion of new business or industrial ventures, or the expansion of existing ones. This definition is intended to encompass job preservation as well, where existing jobs are maintained by minimizing business failures, worker layoffs, or the out-migration of firms. The "development" dimension of job creation and development has come to represent those activities which seek to improve the quality of the working environment as well as worker productivity. Studies have shown that the modification or improvement in the working environment does contribute to a greater sense of worker security, purposefulness, motivation and productivity.[2] Throughout

this report, the phrase "job creation" will be used as a shorthand device to cover both the expansion or maintenance of jobs and improvements in the quality of the working environment.

In most states, job creation is just one of several efforts designed to enhance the economic development of a state or region. Economic development is usually defined as the expansion of productive capacity or "outcomes" of an area and improvements in the quality of life of that area.[3] Wages and interest subsidies, tax incentives, road construction, and housing subsidies represent a few of the strategies utilized on behalf of economic development. Some economists refer to economic development as "growth" or the increase in total value of goods and services produced and the aggregate income generated within a state or region.[4] Increases in employment and in population are frequently associated with regional economic growth. Others associate economic development with improvements in the quality of life and standard of living enjoyed by the residents of a region.[5] The stability of income and employment, the amenities of the environment, the quality of schools, and the availability of other public services -- these they recognize as contributing to economic development.

Those who advocate balanced growth argue persuasively that qualitative considerations are as important as quantitative ones. Having a job with a future is looked upon by most employed persons as more desirable than just having a job.[6] The concept of balanced growth requires a set of prioritized development goals. Newspaper reports constantly cite clashes between those who want to preserve an area's natural resources and those seeking to exploit them. Obviously, not all development objectives are mutually compatible. Choice and tradeoffs among objectives have to be carefully crafted, taking into consideration the unique configuration of resources and market forces appropriate to a given region.

Similarly, job creation and development strategies must be formulated within the larger context of the regional economy. Attracting a small, high technology company with growth potential could prove, over time, to be more desirable in terms of a sound regional development strategy than bailing out an obsolete factory whose competitive posture is declining.

Public officials charged with the responsibility for state and local economic development programs have successfully planned and executed industry recruitment and expansion programs for years. It is they who have had to shoulder the responsibility for promoting an awareness of a state or region's resources and interest in attracting new industry or helping existing business firms expand or thrive. It is they who, in collaboration with management and labor, have taken the responsibility for establishing a positive business climate for improving a state's road and transportation system, and for insuring the availability of a ready and well trained work force. In short, these practitioners have had to persuade their clients and the public at large that their state or region is fiscally stable and efficiently run.

While, in the past, job creation programs have been primarily limited to investment promotion and recruitment efforts organized and administered by an independent industry recruitment unit, that is no longer true.[7] Lower birth rates; the concern with environmental quality; and, shortages of petroleum, electric power, clean water and raw materials have added a new dimension to economic planning. The growing complexity of economic planning at state levels has brought about a need for closer collaboration among state agencies and the private sector. Cabinet level coordinating committees with budget review authority are becoming more and more prevalent.[8] Investments in the development of human resources have grown in magnitude to the extent that such budget items occupy an increasingly prominent place on their agendas. Because vocational education

represents just one of several ways of meeting the training needs of a state or community, its part in the total economic development process is small. Yet, because economic development involves changes in the mix of job skills resulting from industry's response to market changes, vocational education's role, while limited, is nevertheless important. How important will be the topic touched upon in the next chapter.

Organization of the Report

This report has been organized into five chapters. Chapter II examines how states are organized to administer job creation efforts. Three models are described with examples provided. In addition, it looks at the patterns of vocational education program designed to link job creation programs with training. Three statewide and four local vocational education approaches are briefly sketched and guidelines for other efforts are drawn from the examples provided.

Chapter III examines the role of vocational education in economic development in both the public and private sector. How federal, state and local governments have gone about the task of expanding job opportunities is reviewed, partly in terms of classic economic development theory and partly in terms of human resource development strategies.

Chapter IV discusses the role of vocational education planners and coordinators in the job creation effort. The last chapter, Chapter V, forecasts the socioeconomic trends of the 1980's and charts the implications of these trends for vocational education and its part in job creation and development.

NOTES

1. Edgar A. Persons, "Job Creation Through Human Development", VOC. ED., 53(b), September, 1978, p. 31.

2. Work in America. Cambridge, Massachusetts: MIT Press, 1973, p. 13.

3. A. Lee Bruno and L. M. Wright Jr., Rural Job Creation: A Study of CETA Linkage with Economic Development. Washington, D. C.: U. S. Department of Labor, Employment and Training Administration, 1980, p. ii.

4. Michael E. Conroy, The Challenge of Urban Economic Developments: An Evaluation of Policy Related Goals for the Economic Structure of Cities. Austin, Texas: The University of Texas Center for Economic Development, 1974, pp. 1-2.

5. Larry C. Ledebur, "Regional Economic Development and Human Resources Requirements," in Braden, Paul V. (ed.). Human Resource and Regional Economic Development. Washington, D. C.: Economic Development Administration, U. S Department of Commerce, 1977, pp. 6-9.

6. The White House Conference on Balanced National Growth and Economic Development. Final Report, July, 1978. Washington, D. C: Government Printing Office, 1979.

7. David K. Hartley, "State Planning for Economic and Human Resource Development", in Paul Braden (ed.). Human Resource and Regional Economic Development. Washington, D. C: U. S. Department of Commerce, Economic Development Administration, Office of Economic Research, 1977, pp. 120-121.

8. Ibid, p. 128.

CHAPTER II

HOW STATES INVOLVE VOC ED IN JOB CREATION PROGRAMS

From an historical perspective, vocational education in the United States has evolved from an early concern with providing more generic occupational skills which were believed to relate to large families of jobs to preparing students for specific jobs that exist in the labor market. In the process, vocational education has become increasingly important to business and industry as a means of meeting their training needs. Over the years, the relationship between vocational education and industry has been reasonably cordial and close: industry looking to vocational education for immediately employable graduates and schools hoping to place their students in good jobs as soon after graduation as possible. Although the strength of these ties has varied from state to state, the movement toward closer collaboration has been a positive and growing one.

In spite of this close relationship, it should be emphasized that vocational education does not in and of itself create jobs. Its role, however, in helping individuals qualify for or improve their employment status is crucial. This chapter summarizes how states and local communities have gone about involving vocational education in job creation and development. The early part of the chapter describes three prototypic patterns for implementing or coordinating job creation efforts. The second part illustrates how a few states and locations have successfully involved vocational education facilities, programs and personnel in their programs. In a later chapter (Chapter IV) an attempt is made to pull from these examples guidelines for practitioners interested in implementing or adapting comparable programs.

Three State Level Approaches to Job Creation and Development

Each of the coordination or operating models to be described is for classification purposes only and may not exist in a pure form. However, their distinguishing characteristics warrant description in that by doing so, it is possible to identify the advantages and shortcomings of each approach.

1. Single State Agency Model

Economic development and job creation programs following this model are concentrated in a single state agency either by legislative mandate or an executive order of the Governor. The agency is responsible for planning, coordinating, and implementing a statewide program of economic development and job creation. Other state and local agencies including vocational education are expected to lend a helping hand. All contacts with the private-sector are maintained through a corps of professionals whose functions include finding suitable sites for new industries, facilitating land acquisition, making financial arrangements and coordinating licensing and other arrangements necessary to start a new industrial or business venture. These professionals often function as brokers in bringing together prospective industries and communities seeking new jobs.

Recognizing that the availability of trained manpower is one of the more important factors influencing plant location decisions, the economic development team generally includes industrial training coordinators and planners who are often recruited with vocational education backgrounds. However, they operate as a part of the team and have minimal or no allegiance to the regular educational hierarchy in the state. The industrial training professionals assess employer needs, plan training programs, develop curricula and training materials and even conduct training programs.

A number of states have used a single agency approach to economic development programs. Examples can be found in Alabama, Georgia, Louisiana and

North Carolina. However, since most states have adapted the model to fit their own needs, programs differ in considerable detail. For example, in Georgia, [1] vocational education plays an important part in the statewide economic development effort by coordinating industrial training programs in their community colleges and area vocational schools. On the other hand, in some states vocational education provides services only when requested by the industrial training director. Alabama and Louisiana are examples of such states.[2]

The level at which coordination and linkage takes place between vocational education and the economic development agency responsible for job creation and development also differs from state to state. In some states, contractual linkages exist at the state level (Florida, for example) with local vocational schools and technical institutions providing the training. In other states, such as Louisiana, formal coordination linkages exist between state economic development authorities and local school systems and technical institutions. In both cases, however, state and local resources are used to provide the training under contract with the state economic development agency which is solely responsible for needs assessment, client contacts, and planning of training programs. Recruitment of trainees is generally shared between vocational education and the state employment agency in these states.

Single agency states claim that by combining all functions and aspects of economic development in one organization, they have better control over all development activities which allows them to present a coordinated package of services to their clients who have to deal with only one agency. A single agency is also able to respond quickly to the client needs without having the spend time coordinating with other state and local agencies.

2. Multi-Agency Model

The functions of economic development and job creation/development is shared by a number of state agencies with vocational education, either alone or with other educational/training agencies retaining the responsibility of providing training services to the clients. Iowa, Mississippi, Minnesota, Oklahoma, New Jersey, South Carolina and Tennessee are some of the examples of this model. Like the single agency model, there are features which are common to most of the states with multi-agency systems, although each state has evolved the program according to its own needs.

The most important feature of the multi-agency model is the central role assumed by state vocational education in providing training services to the prospective employers. A representative of the state vocational education coordinates with the state economic development professionals to establish contacts with the prospective employers who wish to either establish new plants or businesses or who plan to expand their existing operations, in both cases creating new jobs in the state. After the initial agreement with the client, the vocational education coordinator using state resources assesses specific training needs, plans and develops curricula and training materials, and arranges for the training programs to be conducted in an area vocational school, technical institute, community college or other state or local facility convenient to the site of the new or expanding industrial firm. Many states maintain state equipment pools, sometimes even mobile units, to supplement the local school resources.

Oklahoma's State Department of Vocational Education maintains a cadre of local industrial coordinators at strategic places within the state.[3] An important function of these coordinators, vocational educators by profession, is to provide a local contact with the business firms within their regions. Industrial coordinators, by maintianing regular contacts with employers, serve as important linkages

between the local vocational school and industry. They assess training needs and plan training programs to meet clients' specific needs. They are assisted through the use of state and local vocational education resources to provide this service on a continuing basis. They may also help the local cooperative education coordinators open up new co-op positions with local employers.

In Maryland, training services are coordinated by the Maryland Industrial Training Coordinating Council[4] in which vocational education, along with other state agencies, plays an important role. The Council provides advice and direction to the training programs which are administered through the state department of education. A network of industrial training specialists and coordinators provides assistance to industry by assessing their needs, designing and implementing special training programs, and working with employers on a continuing basis.

Mississippi's industry services program is coordinated by the Governor's Office of Education and Training.[5] In addition to the Governor's office, the Agricultural and Industrial Board, the Division of Vocational and Technical Education, the Research and Curriculum Unit at the University of Mississippi, and the State Employment Service work jointly to promote economic development and job creation in the state. All training needs of the prospective employers, starting with needs assessment and ending with a well trained work force, are guaranteed by vocational education which maintains a cadre of professionals to provide this service. Liaison with industry, as in so many other states using the multi-agency model, is maintained by vocational education linked with industrial coordinators who assess employer needs, design programs, and make follow-up contacts with the employers.

In Tennessee, after an agreement has been reached with the client (prospective employer), classroom training may be provided by an area vocational school, a technical institute, or a skill development center under contract with the

state economic development agency. On-the-job training, co-op training, and in-plant training[6] programs are conducted directly by the industrial training division of the economic development agency that also develops curricula and training materials.

South Carolina operates a network of technical colleges which provide, by contrast, the bulk of customized industrial training programs. In some states, vocational educators, using state and CETA resources, have organized skill development centers where occupational training is provided to meet the ongoing and special needs of employers.

For regular contacts with employers, especially those who want to expand their businesses and industries, South Carolina maintains a cadre of fourteen industrial representatives who are based at the technical colleges. The coordinators provide a continuing liaison between the industry and the technical colleges. They collect and compile data and design special training programs to assist the expanding industries. Other states maintain liaison through regular staff of the development agency.

Although the total responsibility for the job creation process is divided among many agencies, creating a coordination problem, vocational education tends to play a more prominent role in multi-agency states than that played in single-agency states. Part of vocational education's appeal is the speed with which it can respond to and implement programs for employers. Another part of its appeal is its acceptance by the business community. It is not viewed as a threat to their established interests or orientation to employee relations. And, within limits, vocational administrators at the state level can commit staff and resources to collaborative efforts without being afraid of violating federal regulations and guidelines. The quality of leadership is important in this type of system as multi-

state agency coordination takes skill to overcome potential conflicts and to handle the inevitable competition and overlapping authority among agencies.

3. Local Development Model

Initiative for economic development or job creation/development does not always emanate from the state. Many cities, counties and local communities have developed job creation programs using local and federal resources. Local programs may operate independently of state programs or they may work in tandem with statewide programs. Although local programs may have some characteristics in common with state programs, they have at least three distinct elements which differentiate them from the state models. First, greater emphasis is placed on community improvement with the expectation that the community will become more attractive for plant relocation or expansion. This emphasis has been considerably strengthened by monies allocated directly to local governments through such mechanisms as community development block grants from the U. S. Departments of Commerce and HUD. In predominantly rural counties, the Department of Agriculture has played a key role in providing resources to improve community's infrastructures (better roads, sewage disposal system, etc.). Local development programs, thus, are more concerned with improving the quality of life than statewide programs.

Second, not having the resources available for a major recruitment effort, local development programs frequently concentrate on the expansion of local business firms rather than the attraction of new industries. There are numerous examples (such as Kansas City, Kansas; Nashville, Tennessee; and Oklahoma City, Oklahoma) where cities have increased job opportunities for their residents through an organized economic development program aimed at the expansion of existing companies rather than recruiting new business firms.

Third, local development efforts draw most of their professionals from volunteers rather than employees of the state and/or local governments. The

volunteers are generally employees of utility companies, local banks, and transportation companies that have a vital stake in the progress of the city or the community. Chambers of Commerce frequently play an important role in local economic development programs. They are mostly supported and operated through the business community and are likely to have more grassroot strength than the statewide programs.

Vocational education plays an important role in local development programs, often sharing that resonsibility with local CETA prime sponsors. Training support is provided by vocational educators through cooperative education programs and through programs operated jointly or under contract with CETA. Many CETA enrollees are formally trained in vocational education schools. Last year (1979) 19 percent of all CETA sponsored trainees were enrolled in vocational programs. Six percent of Title II of CETA is set aside for supplemental vocational education assistance.[7] A few local areas have industrial coordinators working regularly on developing linkages between vocational education and the business community. In most other places, the function is shared by cooperative education teachers or similar personnel employed by the vocational education schools. Technical institutes and community colleges also play prominent roles in promoting economic development at the local level.

Patterns of Vocational Education Linkage With State and Local Job Creation Programs

A wide variety of vocational education services are being used to support the job creation and development process. Some of the programs are of the traditional variety, while others are of a more recent vintage. Among the better known vocational education offerings are cooperative education, work-study, and apprenticeship training programs. Among the more recent innovations are the

customized industrial service programs, small business management programs, and self-employment or entrepreneurial training.

The purpose of this part of the chapter will be to sketch the dimensions and outline the role of particular forms of vocational education in job creation at the state and community level. Where possible, actual examples of existing programs will be given. Essential components will be highlighted.

State Level Programs

Vocational education program support for statewide job creation efforts can be classified under one or more of the following three types of economic development categories:

1. Attracting new industry;
2. Revitalizing existing industry;
3. Expanding or diversifying a state's economic base.

Some states have elected to concentrate most of their resources on attracting new industry or businesses. Vocational education funds and resources readily lend themselves to the support of this approach. Other states (and many local communities) have emphasized the expansion of existing industries. Here other sources of federal funds have proven helpful. The Rural Development Act (RDA), the Small Business Act (SBA) and the Public Works and Economic Development Act (PWEDA) make grants and loans available to existing businesses.[8] A third approach concentrates on helping or expanding a state's overall economic growth through strengthening a state's infrastructure and promoting new jobs in both the public and the private sector. CETA, PWEDA, SBA and the Housing and Urban Development Act (HUD) all offer support in this arena. Federal support can take other forms which facilitate or inhibit job creation and development, but these three models describe most of the direct efforts.

1. Attracting New Industry

*South Carolina's "Design for the '80's" program is an excellent customized training model which follows on the heels of almost two decades of program support for new or expanding industry. The state's Technical Education System (TEC) has responsibility for putting together the job training features: recruiting, testing, timing, providing appropriate facilities and equipment, communicating with company representatives, and insuring instructional flexibility. The fact that before TEC (1951-1961) only $1.4 billion was invested in new plants and equipment in the state, and since then more than $11 billion in new capital has been invested, augurs well for the future of the TEC program.[9]

*Georgia's "Quick-Start" program, launched in 1966 to serve the manpower needs of new and expanding industry, is also centered around the state's vocational school system. Operated by Georgia's Department of Community Development in cooperation with the Industrial Services Unit of the State Department of Education, a two-phased training approach is usually adopted.[10] Phase One, pre-employment instruction, is designed to bring trainees up to a predetermined proficiency level by means of lecture and lab sessions held at a local area vo-tech school or near the plant site. Phase Two, on-the-job training, enables trainees to move into newly established production lines or job functions and work toward predetermined performance goals. Work attitudes as well as job skills are emphasized at both the pre- and post-employment phase.

One of the companies attracted by Georgia's business development effort was a high technology firm, the Chicago-Latrobe Division of TRW (one of the Nation's leading producers of quality drills, reamers, and end mills). Partly because of Georgia's Quick-Start program, TRW selected Augusta, Georgia, for its new 290,000 square foot plant. During the planning and building stage, a training

building was built at Augusta Tech by local school authorities and leased by the state's Quick-Start program. The training equipment and instructional staff were paid for in part by Quick-Start and by TRW. The company now has plants in three communities in the state, with the Augusta plant annual payroll exceeding $4 million.[11]

II. Revitalizing Existing Industry

* Oklahoma's "special training programs", begun in 1968, have helped to bring a 40% increase in employment during the past decade. By adding regional coordinators to the vocational education staff, the training and manpower needs of existing companies are systematically and periodically surveyed. The needs of existing companies, as well as those of new companies just entering the state, are responded to quickly and with a minimum of red tape.[12]

*Twenty years ago, coal mining was a major industry in Western Maryland, but the low price of oil at that time and the threat of environmental blight forced the mines to close. The advent of OPEC's oil monopoly together with improved mining technology, has given Western Maryland's coal industry a new lease on life.

The Mettiki Coal Company is digging a deep mine on Backbone Mountain in Western Maryland. To meet the needs of the new technology of deep mining, Mettike, with the help of Maryland's Industrial Training Program (MITP), looked to Garrett Community College for assistance in training its workers. As a result of this new effort, Mettiki expects to hire 400-500 people by mid-1980. State officials estimate that each mining job will, in turn, create two additional jobs.[13]

Maryland's training assistance program is coordinated under the aegis of MITP, an advisory board composed of representatives from the State Department of Economic and Comunity Development, the State Board for Community Colleges, the Employment Security Administration, and the Department of Education. The

last agency actually manages the program. Between 1969 (when the program began) and 1978, almost 5,000 people employed by 38 different companies have been trained.[14]

III. Expanding the Economic Base

*The Minnesota Model for Small Business Management Education is designed to develop, increase and improve entrepreneurial skills in performing the work of a business person. The focus is on the self-employed worker and the improvement of his or her productivity. Small business operators are given an intense course of study over a three-year period in business management theory, decision making and record keeping. The course is tailor-made to the types of businesses represented. Organizers of the program estimate that for each dollar spent on the program in 1974, the state (or community) received a net return of $12.[15]

*Rhode Island's Department of Economic Development (DED) Office of Manpower Affairs works directly with other DED divisions in the state to help both attract new businesses and expand existing firms. When a former Navy installation at Quonset Point was closed down, a training facility was established and 1,550 workers slated to be hired by the Electric Boat Division of General Dynamics trained, resulting in an estimated $26 million annual payroll. The state's manpower plan specifies that DED will not train production workers who will make less than $3.50 per hour (the state's minimum wage is $2.50 per hour), thus protecting its existing workers by not trying to attract low-wage industries to th state.[16]

All of these examples of statewide job training programs are designed to support job creation efforts, involve state departments of vocational education (except Rhode Island) and are linked horizontally and vertically with state and local business leaders, Chambers of Commerce, state and local community development

agencies, and CETA prime sponsors. Note that the programs tend to be:

1. Short-term in nature;
2. Tightly scheduled;
3. Small in numbers of trainees;
4. Customized to a company's specific requirements;
5. Provided at a reduced cost to the company being served;
6. Go beyond minimum Federal standards for training and employment;
7. Combine on-the-job training with classroom and lab sessions.[17]

Whether or not a state's job creation or economic development program stresses new industry recruitment, helping existing businesses, or building a more solid economic base, vocational training serves as the basic strategy for linking people with jobs.

Community Level Programs

Four types of vocational education programs currently being used as ways of promoting local economic growth and development are:

1. Customized industrial services training;
2. Small business management training;
3. Cooperative education;
4. Self-employment training.

The first two approaches are directed at adults currently employed or seeking employment. The second two programs are largely geared to in or out-of-school youth hoping to qualify for work through pre-employment training.

1. Customized Industrial Training Services. One of the most successful job creation support programs enjoying broad based support in vocational education circles is what has become known as the "customized industrial training approach".[18] These vocational education sponsored programs require curriculum developers and program directors to link with local businesses and industry in order

to offer tailor-made programs of training for upgrading current employees, providing pre-employment training for new or prospective employees, and in-plant training for new hires on-the-job. Most industry-oriented programs of this nature are offered at company sites, in nearby vo-tech facilities, or in space rented for the purpose.

Most in-plant training programs are conducted by company supervisors trained in instructional methods by local vocational educators. The training is carried on as long as it is necessary to help an employee achieve a certain level of productivity or proficiency. As the need for training diminishes, the supervisor gradually shifts his or her attention from training to supervising.

As reported earlier, a number of states have adopted customized industrial training services programs. In Mississippi, for example, considerable emphasis and attention is given to strengthening the local program coordinator's knowledge and skill in carrying out his or her responsibilities. The local coordinator contacts prospective clients and develops appropriate training materials. In addition, he develops, conducts and evaluates training programs. He coordinates with other community agencies, each of whom has a potential contribution to make to the success of the overall enterprise.

Wall, in a detailed description of the Mississippi program, states:

> "The local program coordinator's mission is a broad one: to improve political, social and economic conditions that are conducive to the conduct of a comprehensive industry services program. For example he or she may have one or more of the following responsibilities: (1) to resolve conflicts between helping - agency professionals and the industry - business clients they serve; (2) to improve communication among the various cooperating agencies; and (3) to be a spokesperson for other programs in dealing with local officials, industry personnel, state legislators, and others who provide funding".19

2. Small Business Management Programs. Closely paralleling the customized industrial training programs are small business management courses (SBMP)

the enrolled businesses to the tune of $5 for every $1 (expended by the community). Business activity (individual added sales divided by individual and community costs) increased seven times in 1974 and 29 times in 1975."[22]

Small business management programs offer several advantages in that they not only hold promise for promoting the economic recovery of cities and depressed areas, but they have been extended to a number of minority groups: American Indians at Fort Wingate, New Mexico; Mexican Americans at Brownsville, Texas; and Blacks at Greensboro, North Carolina.[23] The instructors involved are recruited from the minority groups being served. While two have failed to continue because of lack of local funding, the Brownsville group is now into its fifth year.

The overall advantage of this approach is that not only does it open up more jobs in areas that need them, but it improves the survival rate of new small business firms and substantially improves a community's economic well-being. Possible disadvantages may be that these firms offer employment of the "poorer" variety where employees, other than the owner-operators, suffer from the shortcomings described in Chapter 1. Newer firms, of course, are also more sensitive to downturns in the economy.

In summing up the current perspective on SBMP, Arkansas Governor Clinton said recently, "The spectre which has haunted policy-makers for the past 20 years -- the spectre of smoke stacks to be won or lost -- was a grave misrepresentation of what is truly important for employment growth. The real long-term net job growth is from the creation of new businesses and expansion of small businesses."[24] Helping small firms grow and survive through training and other community support mechanisms, while a difficult task because of the volatile nature of these firms, offers one of the more attractive alternatives for job creation at the local level.

directed at small business owners and operators (and their families) who are eager to improve their business management skills.

Such courses encompass three program goals:

1. Increasing the trainees knowledge and understanding of economic and business principles upon which sound business practices are based;

2. Improving operational and record keeping skills needed to perform the everyday functions of a small business;

3. Strengthening problem solving and decision making skills in response to changes in the economy and markets;

4. Strengthen the owners/managers ability to link with other agencies and community services in the operation of a business.20

Most SBMP's are community-based where the instructors, usually tied to an educational institution, take the courses to their students by offering them in store front classrooms, and area vocational schools, etc.

One of the better known SBMP efforts was begun by Edgar Persons at the University of Minnesota in 1972. It provides business operators with classroom instruction as well as individual on-site training. Typically, these programs involve community colleges, area vocational schools, adult continued education centers, and even the agricultural cooperative extension service. Classes are offered on a weekly basis and extend over a three-year time period. They involve small group meetings, monthly on-site instruction, and are frequently supplemented by special classes on advertising, marketing, sales, etc.[21]

During the 1974 recession, when many small businesses across the country were facing bankruptcy, the 75 adult students enrolled in the SBMP program successfully increased their business profits. "For each dollar they invested in the program during the two years (of training), these entrepreneurs realized a return of $12 and $11 respectively ... The community benefited from the increased profits of

3. Cooperative Education. Perhaps the best known of all vocational education (and higher education, for that matter) approaches to finding or creating jobs for students, is that which directly links in-school instruction with on-the-job training. Cooperative work studies provide an occupational laboratory for classroom instruction. The on-the-job experience offers the student an opportunity to apply and polish his or her developing skills.

A typical cooperative education program operated by the Cleveland public schools,[25] enrolls over 13,000 students in five major vocational education areas (T&I, horticulture, home economics, business and distributive). All students are supervised by a vocational education coordinator whose responsibility it is to insure that the work opportunity provided by an employer relates directly to the occupational training that the student is receiving in school. In Cleveland, 70% of the students in the cooperative work experience program are subsequently employed by the company for whom they worked. Even if a student becomes a full-time employee, the cooperative work experience station remains open for another student to step into, thus keeping open the training opportunity year after year.

So successful has been the cooperative education effort that a recent report of the Carnegie Council for Policy Studies[26] recommends that cooperative work-study programs be expanded and that all high school age students should develop both knowledge and employable skills in this manner.

Students benefit from enrolling in cooperative education programs because it helps them in making the transition from school to work. During their experience, they are exposed to the newest operating equipment and learn what it is like in the day-to-day working environment. Many, particularly female students and minorities, would not have had access to such job experience without someone opening that door for them and thus enabling them to demonstrate their capabilities.

Employers benefit, also, in that it gives them an opportunity to observe the cooperative students before offering them a job. And, because of tax credits and wage subsidies made available through CETA and vocational education legislation, many employers are able to defray part of the cost of training the co-op student. One-half of an annual salary of up to $6,000 can be deducted for each co-op trainee who qualifies.[27] While this may attract certain employers who traditionally pay low wages and who seek wage subsidies as a means of cutting labor costs, careful scrutiny by the vocational education co-op supervisor often prevents such exploitation from occurring. Nevertheless, in such fields as the fast food industry, pressure is being applied at the state level to qualify work-study programs as cooperative education programs in order for the employer to qualify for a tax rebate or tax credit.[28]

One of the advantages of the cooperative education program is that it frequently attracts smaller employers who want to take on part-time workers. In Cleveland, for example, cooperative education students in the field of horticulture are filling slots in local florist shops, nurseries, and landscaping or gardening firms.

4. Self-Employment Training. Having as its major objective the training of youth for self-employment, participants are given the opportunity to develop attitudes and understanding of how they can chart their own destiny in an open and competitive free market economy. The key question that such students are asked to confront is, "How am I going to create a job for myself?"

Through simulation of small business operations by setting up student-run establishments such as dry cleaning, home repair, landscaping, etc., students are able to acquire first hand experience as small business operators. Students typically are asked to rotate among various jobs providing them with experience in the production, marketing, and accounting end of the business. Such programs encourage students to develop their entrepreneurial skills as well.

In Hartford, Connecticut, public school students are able to work for pay in 15 businesses operated by the school system.[29] Among the types of business ventures operated are a repair shop for automobiles, a loan company, a bakery, and a storm door manufacturing installation service.

Three basic models of entrepreneurial youth enterprises exist:

a. Training for self-employment — usually involves students who are already trained or about to complete specific vocational programs and are interested in self-employment as a natural outgrowth of their training;

b. Extension model — enables students to cut across several areas of work experience. The students are exposed to all aspects of running the business and if possible become actual shareholders in the enterprise;

c. Cooperative model — designed to attract out-of-school youth to a vocational program and often involves disadvantaged students who qualify under CETA. CETA pays a stipend to the student, allowing profits from the business to be returned to the business itself.

The advantages of entrepreneurial programs are, of course, that they strengthen the student's skill as a business operator and enable the student to learn first hand whether becoming an entrepreneur is a goal which the student wishes to pursue. The drawback or disadvantage may be that because such programs represent a somewhat protected environment, students may develop false perceptions of themselves as potentially successful entrepreneurs.

NOTES

1. James R. Morris, "South Carolina—Where Technical Education Means Business," Voc. Ed., 54, Nov./Dec., 1978, pp. 49-51.

2. Brochures prepared by the Louisiana Office of Commerce and Industry (Baton Rouge, Louisiana) and Alabama Industrial Development Training (Montgomery, Alabama).

3. Patricia W. Goodman, "Vocational Education Can Create and Preserve Jobs," Special Report, American Vocational Association, February, 1979.

4. The Maryland Industrial Training Program: Status Report 1969-1978. Baltimore, Maryland: Maryland State Department of Education, Division of Vocational-Technical Education, November, 1978.

5. Kent Brooks, Keith Herring, and Howard Newby, Start-up Training in Mississippi: Program Development Guide. Mississippi State, Mississippi: Mississippi State University, RCU for Voc.-Tech. Ed., 1974.

6. In-plant training refers to training programs conducted at the employer's place of business with operating equipment used for training purposes. In this instance, instructors are frequently recruited from among the employer's work force. For definitions of various forms of on-the-job trailing, see American Society for Training and Development, Training Methods for Skills Acquisition. Madison, Wisconsin: ASTD, 1972.

7. Stuart Rosenfeld, Education and Local Development: Federal Policies and Programs for Education and Local Development in the United States. Paris, France: Organization for Economic Cooperation and Development, Center for Educational Research and Innovation, January, 1980, p. 27.

8. Ibid., p. 18.

9. G. Williams Dudley, "South Carolina's Design for the 80's", paper presented at The American Association of Community and Junior Colleges 60th Annual Convention, San Francisco, California, March 30, 1980.

10. David K. Hartley, "State Planning for Economic and Human Resource Development," in Paul V. Braden (ed.) Human Resource and Regional Economic Development. Washington, D. C.: U. S. Department of Commerce, Economic Development Administration, October, 1973, p. 130.

11. Georgia State Department of Education, Industrial Training Services. Atlanta, Georgia: State Department of Education, Industrial Services Unit, 1980.

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14. The Maryland Industrial Training Program Status Report, 1969-1978. Baltimore, Maryland: Maryland State Department of Education, Division of Voc-Tech Education, November, 1978, p. 1.

15. Peter L. Porteous, "Daring To Be Different", Voc. Ed., 53 (6), 1978.

16. Hartley, op, cit., p. 127.

17. Tuttle and Wall, op. cit., p. 3.

18. The term was introduced in a report issued by The Northeast-Midwest Institute entitled The Neglected Resource: The Use of Employment and Training Programs in Economic Development Strategies, (Washington, D. C.: Northeast-Midwest Institute 1980).

19. Francis T. Tuttle and James E. Wade, Revitalizing Communities Through Industry Services Programs. Arlington, Virginia: American Vocational Association, Critical Issues Series, No. 2, 1979, p. 8.

20. Edgar A. Persons, "Job Creation Through Human Development", Voc. Ed., 53 (6), September, 1978.

21. Ibid., p. 32.

22. Porteous, op. cit., pp. 37-38.

23. Ibid., p. 38.

24. Quoted in a Wall Street Journal article authored by Neal R. Pierce, "Smokestack Chasers Who Miss The Point", May 30, 1979.

25. Donald V. Healas, "Vocational Education: Role in Establishing Secondary Students in Business and Industry". Paper presented at The National Conference on Job Creation and Development, Washington, D.C., May 3, 1978.

26. John T. Grasso, Vocational Education and Training: Impact on Youth. Berkeley, California: Carnegie Council for Policy Studies Technical Report, 1979.

27. For a brief, readable summary of federal hiring incentives for employers, see Federal Hiring Incentives. Washington, D.C.: National Manpower Institute, July 1979; See also: "Targeted Jobs Tax Credit and WIN Credit", Internal Revenue Service Publication #906.

28. Information provided by California State Department of Education officials.

29. Porteous, op. cit., pp. 34-35.

CHAPTER III

FEDERAL, STATE AND LOCAL ECONOMIC DEVELOPMENT STRATEGIES

Much has been written about the role of federal economic development programs in shaping the overall level and distribution of employment in the United States; somewhat less about state and local expenditures and initiatives; and much less on the collective impact of these programs on local businesses' decisions to hire, expand, or maintain their current employment levels. Decisions of this kind are guided by the interaction of a complex set of variables, among them the availability of a skilled work force, the cost and accessibility of materials, and the ambiance of the environment.

Interest in and concern for economic development at the state and local level has become a preoccupation of state and locally elected officials. Part of the concern tends to be cyclical in nature, reflecting the problems that arise when there is a downturn in the economy accompanied by falling tax revenues and rising unemployment. The other reason for concern, principally among the officials of midwestern and northeastern states, is the continued economic growth enjoyed by the southern and western regions of the country. Polticians located in states in other than those two regions have been questioning their own economic development strategies. They have come to recognize that successful programs require more than luring established companies from other states. They require a plan, leadership and the necessary human and material resources needed to construct a sound economic growth and development program.

This chapter is concerned with two tasks: (1) identifying the basic elements that comprise an economic development strategy; and, (2) describing the role that federal, state and local governments are playing in the execution of that strategy. Chapter II illustrated how states and local communities have been or are currently

engaged in job creation efforts. This chapter amplifies that thesis by dissecting and analyzing the elements that, in combination, make up a successful program.

Factors Contributing to Economic Growth

Regional economic growth and development is very much like a vegetable garden. It needs plenty of light, water, and other nutrients in the proper amount for it to flourish. If one of those key ingredients is missing, you will not get the results you hope for, even if the other elements are present in large quantities. In a similar way, economic growth depends on five key elements (the five M's) which must be present for growth to occur.[1] These are Money, Materials, Markets, Management and Manpower. By describing in a brief way just what role each of these five ingredients play in economic growth and development, those concerned with overseeing or implementing a statewide or community based economic development program will be in a position to judge the relative important of each.

Money: The capital needed to transport and transform natural resources into a marketable product. Capital is supplied by individual investors, banks or other private sources, or it can be provided through public channels. Economic theory argues that the private or corporate investor is primarily interested in maximizing profits by investing in projects that offer the greatest financial return. Unfortunately, today's economy is such that investors are reluctant to advance the necessary capital needed by industry to modernize or expand its productive capacity. Inflation and an uncertain international market have eroded their confidence in our domestic economy. Inflation also adds to the cost of replacing plants and equipment, thus exacerbating the need for additional capital.

Publicly supplied capital can take the form of highways, rail lines, electric utilities, and schools. Needless to say, an inadequate supply of "social overhead" capital in a region may render that location unattractive to private firms. The federal government has recognized that fact for years. We have only to mention

the work of the Tennessee Valley Authority, the Appalachian Regional Commission, Economic Development Administration, the Farmers Home Administration, HUD's economic development grants to cities, the Urban Mass Transit Administration's effort to improve public transportation systems, the Community Services Administration's support for community-based non-profit organizations aimed at alleviating the problems of poverty, unemployment, urban decay and, last but not least, the Small Business Administration's loan guarantee program. Each of these federally sponsored initiatives is aimed at balancing the differences among regional economies.

Materials: The natural resources located within a particular geographical area. Its minerals, climate, plant and animal life, type of soil, water supply, land availability and sources of energy all represent those natural ingredients which can be combined with labor to create jobs. Proximity to raw materials was once a major consideration in decisions to locate a plant. But, as raw material costs declined as a fraction of total costs, such concerns became less important. In recent times, however, the rising cost of land and energy have pushed these items back to center stage. Federal regulations, for example, have placed energy producing states at a distinct advantage over non-producing states.[2]

One caveat regarding natural resources: people's tastes and lifestyles change with the times. What was once viewed as a valued natural resource may no longer be valued in an economic sense. Sulphur spring spas gave way to ski resorts and scuba diving. Planners and economic developers must be sensitive to changing markets and the demand for materials that supply those markets.

Markets: Places where a company sells its products or provides its services. Adapting to changing markets and being able to exploit emerging opportunities demands a responsive and flexible management and work force. According to Vaughan,[3] market considerations are the single most important element in

explaining interstate differences in economic development. The demand for goods and services stimulates business growth, which in turn creates more jobs. Growth in employment increases the demand for more goods and services, thus opening up more jobs, leading to more growth in employment, etc. This upward spiral in the local economy, because of population and income growth, is recognized by some as a critical factor in employment growth. Ease of access to materials and markets is a function of the availability and cost of transportation. In the past, reduced transportation costs made it unnecessary to locate near supply sources, but that picture is changing. Even before the upsurge in the price of fuel, firms were found to be more sensitive to the cost of transporting their products to market ("output" costs) than to the cost of "input" transportation.[4]

Management: The people who oversee the combining of materials, money, and manpower resources in order to successfully produce and market a product or service. They are the catalysts which bring about economic growth and development. Effective managers require vision, problem solving skills, motivational ability, and the ability to resolve labor problems. But most of all, they need to be skilled communicators. Effective links between the public and the private sector depend on top management's ability to communicate needs, negotiate differences, and build support for new programs. Directors of local economic development efforts are discovering that one of their chief challenges is identifying and harnessing managerial talent in both the private and the public sectors.

Manpower: Human resources needed to convert natural resources into finished goods or services for consumption in the market place. An adequate supply of qualified labor helps to insure a reasonable profit at an acceptable wage level. Changing technology and shifting markets can yield dramatic shifts in the demand for certain types of skills. Firms that are subjected to fluctuations in

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demand (seasonal or otherwise) must have access to large labor pools. A stable labor force is preferred by those companies who must train their own workers or who hope to protect certain trade secrets. A shift from labor intensive to capital intensive production methods in the resource-based industries (e.g., forestry, mining, agriculture) has, for example, left large pools of surplus labor in rural areas competing for a limited number of jobs, thus keeping wage rates low.[5] (This is one of the reasons cited for the migration of labor intensive industries to rural areas, particularly in the South). Labor is the single most important element in production.[6] In the manufacturing sector, nearly one-half of the value added to products in 1972 was spent on payrolls.[7] Non-unionized labor is preferred because of the impact of unions on wage rates and fringe benefits.

The availability of trained manpower is among the six most frequently mentioned factors cited as influential in business locational decisions.[8] Among the other factors which contribute to the appeal of a region or community to industrialists are: (1) the quality of the school system; (2) climate; and, (3) recreational facilities.

Thus, the availability of skilled personnel and the willingness of a state or community to insure public support of training, particularly during periods of recession, do figure in business decisions to locate or expand operations.

Job Creation and Development by the Private Sector

In this country, the private sector has been viewed as the best creator of jobs. And during the last two decades, it has functioned very well in that capacity. Total employment in the United States has grown dramatically. Between 1970 and 1977, the total labor force increased by 18%, from approximately 82.7 milion in 1970 to 97.4 million in 1977. Females entering the labor forced increased by 27% while the male labor force increased by 12%. The employment of young adults outstripped all other age groups by increasing a total of 33%. During the 1970's,

women and youth accounted for 4/5ths of the growth in the labor force. These trends (higher employment for women and youth) are expected to continue into the '80's.[9]

Recognizing the significant role that the private sector plays in job generation, President Carter in his economic report to the Congress in January, 1978, said, "We should rely principally on the private sector to lead the economic expansion and to create new jobs for a growing labor force". It was the President's view that by emphasizing the creation of jobs in the private sector, the nation's resources would be used more efficiently and our capacity for absorbing more people into the work force would expand more rapidly. While he stressed that the federal government should be an active partner in meeting national needs, he put his support squarely behind ways of enhancing the growth and spread of private industry.

Not all sectors of industry, however, are able to contribute to job formation at the same rate. According to a Commerce Technical Advisory Board Report, published in 1978,[10] young high technology companies' employment grew at an annual rate of 41% as contrasted with large, mature firms that increased at an annual rate of only 0.6% between 1969 and 1974. In a monumental study conducted by David Birch of M.I.T. involving 5.6 milion business establishments over a seven-year time period (1969-1976), small firms were identifed as the country's biggest job creators. Sixty-seven percent of the 6.8 million net jobs created in the private sector were in firms with 20 employees and under.[11] Eighty percent of the replacement jobs generated over this time span were created by newer firms. Birch concludes that "the job generating firm tends to be small. It tends to be dynamic -- the kind of firm that banks feel very uncomfortable about. It tends to be young. In short, the firms that can and do generate the most jobs are the ones that are the most difficult to reach through conventional policy initiatives."[12]

Birch also found that employment in firms acquired in mergers grow at somewhat lesser rates than in similar size but independent companies. Conglomerates have been tagged as being responsible for more plant closings than either larger corporations or small business because they are less willing to ride out or accept a business downturn than local owners who are more closely tied to the community.[13]

Not only does the size and age of a company determine its growth rate, but the type of industry involved has a profound influence on the number of new jobs generated as well. The manufacturing industry, for example, has been declining steadily over the last three decades in its share of total employment.[14] The significance of manufacturing, however, on a region's economy is reflected in the higher income level of its workers. The Bureau of the Census indicates that since World War II, manufacturing has contributed about 30% of the total national income.[15] Thus, manufacturing is responsible for a large share of the nation's economic growth and vitality, even though the growth in number of people employed in this sector might indicate otherwise. Should employment levels in manufacturing establishments continue to decline in a particular region, that process will impact on other sectors of employment such as wholesale and retail trades and the service industry.

From a regional perspective, manufacturing employment in the South and West increased by 900,000 and 300,000 respectively but declined in the Northeast by almost 800,000[16] between 1968 and 1978. A gain of 200,000 in the North Central region in the same time span was largely the result of growth in the less industrialized states west of the Mississippi River.

The nature of manufacturing employment also differs among the four regions. The West, for example, employs twice as many workers in durable goods as in non-durable goods industries. The South, on the other hand, has slightly more

workers in non-durable goods industries. Durable goods manufacturers pay higher wages and offer greater job security than do those in the non-durable goods companies. Where workes in the South are employed in durable goods, they tend to be those of the low wage type, e.g., lumber and furniture. Textiles and apparel, both dominate employers in the South, and are traditionally low paying industries. Non-durable goods industries in the South average only slightly more than $4.00 an hour in 1978, compared with more than $5.70 for non-durable goods industries elsewhere in the U.S.[17]

Not all observers of the economic development scene concur that the national interest is best served through public support of job creation activities in the private sector.[18] Some economists view the job creation process as one requiring that a distinction be made between what are "good" and "poor" jobs (the "dualist" perspective). The better jobs are those that have built-in job security, advancement opportunities, good working conditions, some influence over the way the work is organized, fringe benefits, and higher wages.[19] Conversely, the poorer jobs, they argue, tend to be labor intensive, pay low wages, offer little opportunity for advancement, and often are located in non-union shops.

Other economists argue that the shortage of good jobs can be traced to an inadequate level of aggregate demand. The use of public monies to stimulate growth in the private sector is not only acceptable but desirable. Still, other economists counter with the argument that public subsidy of "training costs for workers who are eventually hired by large firms has the effect <u>not</u> of increasing the number of good jobs which those firms provide <u>but rather</u> of increasing their profit as a result of the reduction in their internal costs of training."[20] The use of public funds to support the establishment and operation of community based, non-profit enterprises would, they feel, better serve the needs of disadvantaged workers through the creation of "good jobs".

Encouraging the expansion of small firms may preclude the creation of "good job" opportunities because of the high failure rate and marginal working conditions. Even those firms who, according to Birch, are likely to grow larger must frequently take risks in trying to beat their competition and thereby may suffer severe profit losses from time to time, especially during periods of recession. The precariousness of these small business firms creates a less-than-desirable employment situation.[21]

Birch's data reveal that the larger firms are more stable but do not create as many jobs. Only 35% of the companies with more than 500 employees and ten years of experience or more showed a net increase in employment. The remaining 65% reduced their level of employment or folded.

Even more important was the finding that large corporations tended to shift their operations to areas where the per capita income is lower and where organized labor has little influence. This was particularly true in the north central and northeast sectors of the country where manufacturing dominates. Those few jobs that are generated are usually in branches and subsidiaries of these larger companies whose headquarters are located in the North. Only in the service industries does each region of the country tend to dominate its own territory with the noticeable exception of southern entrepreneurs who opened up or generated as many service jobs in the Northeast, Midwest and West as more contiguous firms did. Birch concludes that, "The larger corporations, using their financial strength, are the first to redistribute their operations out of declining areas into growing ones. They do not hesitate to locate branches in greener pastures, placing an even greater burden on the smaller firms in struggling areas like the Northeast."[22]

Job Creation and Development by the Public Sector

Through taxes and expenditures, the federal government has sought to shape the aggregate demand for and the supply of goods and services. How effective

these policies have been is a matter of considerable debate. Part of that debate centers on whether or not there is a coordinated federal policy for regional economic development. While a number of federal assistance programs had been directed at underdeveloped regions of the country, the results have been mixed. The Tennessee Valley Authority Act (TVA), the grandfather of most development programs, did succeed in raising the per capita income of the region from less than half of the national average in 1933 to above the national average in 1979. On the other hand, the impact of the Public Works and Economic Development Act has had mixed reviews.[23]

Braden and Paul[24] contend that regional economic assistance programs have had little, if any, impact on the regional distribution of jobs. This issue was the focus of a White House conference on balanced national growth and economic development held in 1978. The conference succeeded in identifying some of the complexities and inconsistencies in federal laws and regulations impacting on various regions of the country.[25]

There have been a significant number of legislative initiatives (see below) concerned with creating "good jobs" at fair rates of compensation. While much of the recent CETA and Vocational Education legislation is concerned with resolving the problem of unemployment by targeting on the training needs of individuals, these other federal initiatives have sought to achieve the same goal by strengthening regional economies.

The following brief account of federal agency activities characterizes the scope of economic development efforts directed at enhancing or revitalizing various regions of the country. Some are concerned with urban, others with rural, development. About $14 billion was allocated in support of these programs in fiscal year 1979 alone.[26]

Department of Commerce, Economic Development Administration

The Department of Commerce has been involved in economic development activities since 1961 when the Congress established the Area Redevelopment Administration (ARA) to "alleviate conditions of substantial and persistent unemployment and underemployment in certain economically distressed areas." In 1965, legislation was adopted (The Public Works and Economic Development Act) to change the name of ARA to the Economic Development Administration (EDA) and to modify its duties and responsibilities. The EDA, however, is still mandated to promote economic development as a means of correcting persistent unemployment and underemployment. The agency makes grants and loans for public works' development and improvements (for example, industrial park development and downtown revitalization). It is also authorized to make loans and loan guarantees to firms in economically distressed areas for purposes of land acquisition or for working capital. During FY 1979, EDA funding for its regular economic assistance activities was on the order of of $513 million. The Agency also administered the Local Public Works program that was passed in 1977 as part of the Carter Administration's anti-recessionary economic stimulus program.

Department of Agriculture, Farmers Home Administration

The Farmers Home Administration (FmHA) was established in the 1930's. Its principal function is to help farmers, qualified youth, and other rural and small town residents with inadequate resources to improve their economic status and quality of life. In addition to assisting individuals and families, FmHA assists local governments and their entities to finance facilities and services; it also guarantees repayment of loans made by private lenders to non-urban business and industry. The purpose of these latter activities is "to help rural areas develop creatively and improve their economic base, including job opportunities."[27]

During FY 1978, FmHA made loans and grants totaling $2.3 billion classified as development assistance for community programs. Almost $1 billion of this total

was distributed in the form of business and industrial loans. Other community programs supported include financing for water and waste disposal systems and for community facilities. In addition to these community programs, the FmHA has housing assistance programs totaling about $4 billion.

Activities of the Rural Electrification Administration, another unit of the Department of Agriculture, are closely related to economic development. A 1976 publication of the REA states that since 1961 REA-financed systems -- through the establishment or expansion of community and industrial facilities -- have helped create more than 500,000 jobs.[28]

The Rural Development Act (RDA) of 1972 was also found to be effective at improving employment in rural areas. The Act sought to strengthen the infrastructure of rural areas (fire protection, waste disposal, health services, water, etc.) and integrate various project grants and loan programs under the control of USDA. Under Title V of the Act, land grant universities were called upon to help link rural development projects to agricultural extension services and other government service programs. As a result of pilot efforts authorized under Title V undertaken in the period 1974 to 1976, more than 500 projects were completed with most projects creating 10 or so permanent jobs.[29]

Department of Housing and Urban Development

HUD's involvement in promoting economic development is largely through its Community Development Block Grants program (CDBG) and its Urban Development Action Grant (UDAG) program. The CDBG program is a form of special revenue sharing which, between 1974 (when the legislation was enacted) and 1977 was directed primarily at the housing problems of low-income families. While housing improvements continue to be the primary goal of CDBG, since 1977 monies have also been expended on public works' activities. UDAGs are used to stimulate private investment in discrete industrial, commercial or neighborhood projects

(such as assisting in the construction needs of an expanding firm; land acquisition for a hotel, retail space and parking facility; or housing improvements). Estimated FY 1979 funding levels for CDBG and UDAG were respectively $4.3 billion and $580 million.

Department of Transportaiton, Urban Mass Transit Administration (UMTA)

The Urban Mass Transit Administration makes grants to localities to help establish local transportaiton systems or to upgrade existing ones. A substantial portion of the funds granted under UMTA programs ($4 billion in FY 1979) are used to acquire busses and other capital equipment. A portion of the funds, however, is used for projects that often are related to neighborhood or downtown development; these include construction of intermodal terminals and transit malls. In FY 1979, $80 million were used for these purposes.

Community Services Administration, Office of Economic Development

The Office of Economic Development provides funds to Community Development Corporations (CDC), community-controlled nonprofit entities, that are established to address problems of poverty, unemployment, and physical deterioration in special-impact areas. Grant funds are used as venture capital to leverage other public and private funds. CDC's follow a variety of strategies. Some emphasize labor-intensive projects to maximize current employment; others stress business development, looking to the longer term enhancement of employment opportunites; and, still others are attempting to retain existing jobs. The CDC program is limited in terms of total dollars and coverage of the country. About $45 million were available in FY 1979; a recent report of the CSA indicates that there are 40 CDCs funded by CSA; the total number of CDCs funded from all sources (federal and nonfederal) is estimated to be about 150.

Small Business Administration (SBA)

The SBA conducts loan and loan guarantee programs for minority and other small businesses that can be important to economic development. While the principal objective of SBA programs is the provision of assistance to small businesses, it also supports neighborhood revitalization programs. This is a technical assistance program designed to assist neighborhood business people in learning how to utilize the various federal aid programs that are available.

Appalachian Regional Commission (ARC)

Passed into law in 1965, the Appalachian Regional Development Act sought to focus dollar resources on potential growth centers in the expectation that such growth would eventually diffuse to nearby areas. Most of the provisions of the Act are aimed at preparation for economic growth, rather than direct support for development.[30] Community development is its principle concern. Direct aid to the private sector is specifically prohibited.

It is worth noting that the Act specifically (Part B, Title II) earmarks funds for the construction and operation of vocational and technical education centers. While such support is currently being cut back, between 1966 and 1973 more than $200 million was spent by the ARC on vocational education programs and facilities.[31]

The Vocational Educaton Amendments of 1976 and CETA

Each of the previosuly described government programs support economic development by boosting local economies and promoting the creation of jobs. They tend to assume that a trained or trainable workforce exists. They view unemployment as basically cyclical in nature and balanced economic growth as an obtainable goal.

In contrast, "education and training policy, as promulgated by the Department of Education and the Department of Labor, seems to assume that

unemployment is basically structural and that if only the unemployed and the underemployed had the requisite sets of skills and attitudes (and, in some cases, be willing to relocate) they would find meaningful work."[32] Even with these differences in policy orientation, however, these two agency programs share with their sister agencies a common concern for reducing unemployment, controlling inflation, raising productivity, and ensuring equity of access to training and employment. While the next chapter discusses in greater detail the current and potential role of vocational educators in local economic development, suffice it to say at this point, their potential contribution has only been scratched.

The Role of State and Local Governments

The sometimes incompatible goals of federal agencies and private business firms are seeking to alleviate unemployment and regional discrepancies in the economy, yet to also maximize profits, put pressure on state and local governments to take an active role in resolving potential problems, and to shape their own economic destinies.[33]

It is important to recognize that state (and regional) economies find it hard to be self-sustaining. To meet the demands of local consumers, many products must be imported from elsewhere. In the process, locally earned income is siphoned off to producers outside the state or region. To maintain a balance of trade, goods and services created within a region must flow to other locations in order to bring about an influx of non-local dollars. By focusing on the export of goods and services, a statewide economic development plan is more likely to attract monies into the local economy which can then be re-spent for creating more job opportunities. According to Braden and Paul:

> Expenditures or demand flows can be categorized in the same manner as at the national level, i.e., households, businesses, and government. The aggregate of the spending from the household, business, and local government sectors, along with the demand for goods and services from other regions, are the income

> determinants of the regional economy. The expenditure determinants include imports by the private and public sectors of the regional economy and the accrual of private export sales of businesses and intergovernmental transfers to local governments.[34]

The Advisory Commission on Intergovernmental Relations recently published a summary and overview of state sponsored community development activities.[35] It reported a rise in interest in economic growth and development programs. However, in those states and regions experiencing rapid industrial growth, regional wage rates had risen rapidly, bringing with it a significant in-migration of population which in turn created a range of other problems: congestion; rising consumer prices; and, an increased demand for expanded public services. These "social costs" impacted on the quality of life of state residents.

States experiencing a decline in employment, on the other hand, had to cope with the myriad problems associated with rising welfare costs, a shrinking tax base, and the out-migration of skilled workers. In both instances, the report asserts that there has been an upsurge in state level interest in the effective coordination of local and substate regional development efforts. The northeastern and central states tend to be more concerned with the revitalization of central cities and the problems of the unemployed. The South continues its interest in the economic development of rural areas and the smaller communities. And, the West and Plains states are more concerned with managing the dislocations associated with rapid industrial growth.

State leadership has emerged as an essential ingredient in any economic development effort. Modifications in tax policies is just one of several strategies being employed. Changing program priorities, redistributing expenditures geographically, and regulating local economic and fiscal practices represent others. Appropriately, it is the state government which has taken the most active role in

bringing vocational education capabilities and resources into equal partnerhsip with other economic development programs.

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NOTES

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CHAPTER IV

THE VOCATIONAL EDUCATOR'S ROLE IN JOB CREATION AND DEVELOPMENT

Having identified how job creation and development programs are organized and how federal, state and local agencies are participating in economic development efforts, a careful examination of how vocational educators can play a role is warranted. Standards or criteria of effectiveness identified emerged from the sifting of detailed descriptions of on-going programs available through a raft of publications. Guiding this inquiry was a systems perspective which made it possible to classify vocational education job development efforts into three functional categories: input; process; and, output functions (see Figure 1). This systems view provides a ready made framework for looking at the overall process as an integrated whole made up of interacting subsystem elements. Output elements were judged against those input and process variables which relate to that output. "Effective cooperation among concerned organizations and agencies" at the community level, for example, depended upon which organizations and agencies were involved, how clearly their role in job creation programs had been spelled out, and the competencies, attitudes, understanding and commitment of the individuals participating. "Effective timing" of a customized training program required advanced knowledge of a company's training needs, adequate time to assemble training materials, equipment, staff, and sufficient lead time to recruit, train, and place the trainees.

Attempts to break an on-going program down into its constituent parts necessarily reduces what should be portrayed as a dynamic process of something of a static state. A systems perspective should also portray the dynamics of how job creation models are conceived and executed. That type of "flow" is portrayed in Figure 2. Here we are not simply content to isolate those key ingredients of job

Input Variables	Process Variables	Immediate Outcomes
*Characteristics and attitudes of potential employees (e.g., personality, skills, interests)	*Degree of voc. ed. coordinator involvement in jc/d activities	*Customized training offered trainees at a time and place convenient to them
*Resources of federal, state and local economic development commission, voc. ed., CETA programs, etc.	*Number of other agency representatives and business leaders actively participating in program	*Effective cooperation among all agencies concerned evidenced
*Business climate (e.g., quality of labor-management relations, etc.)	*Type of service provided by program (e.g., training, education, work experience)	*Number of trainees placed in jobs
*Economic development potential (e.g., materials, capital, management, production technology)	*Availability of inservice training for staff	*Number of companies served
*Training equipment, materials, and facilities	*Number of links with state and federal agencies	**Intermediate Outcomes**
*Quality of state and local leadership	*Level of authority delegated to person with responsibility for negotiating arrangements with private industry	*Improved economic climate leading to immigration of new industry or retention and expansion of existing ones
*Government (federal and state) employment policies	*Number of contractual conditions to be met by business clients participating in jc/d program	*Stability of employment over time
*Income distribution programs	*Intensity of outreach effort (e.g., publicity, number of contacts, site visits)	*Net migration rate
*Incentive structures		**Ultimate Outcomes**
*Current mix of business and industries		*Expanded full and part-time employment
*Level of capital investment		*Change in per capita income

FIGURE I. FACTORS IMPACTING ON STATE LEVEL JOB CREATION/DEVELOPMENT (JC/D)

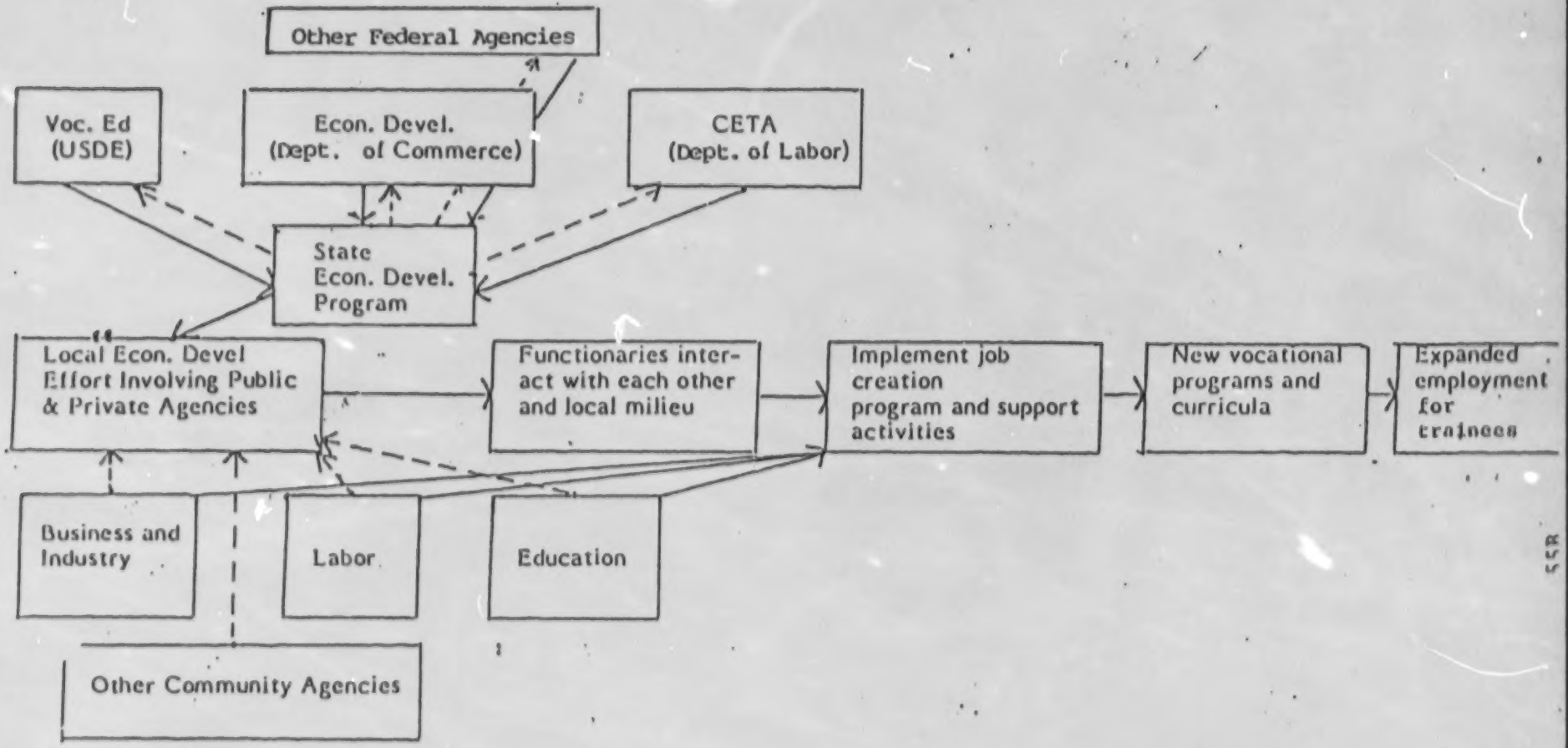
Other Federal Agencies
Voc. Ed (USDE)
Econ. Devel. (Dept. of Commerce)
CETA (Dept. of Labor)
State Econ. Devel. Program
Local Econ. Devel Effort Involving Public & Private Agencies
Functionaries interact with each other and local milieu
Implement job creation program and support activities
New vocational programs and curricula
Expanded employment for trainees
Business and Industry
Labor
Education
Other Community Agencies

FIGURE II. SIMPLIFIED IMPACT MODEL OF A JOB CREATION PROJECT

creation that must be present if successful program implementation is to take place, but we also suggest how those elements should interact.

Input Variables

Adequate funds are needed to organize and maintain an effective job creation program. To support essential staff and to provide the appropriate training, staff and equipment need to be acquired, trainees recruited (and, in some cases, compensated) and adequate facilities found. Both federal and state monies are being tapped for this purpose. South Carolina, New Jersey, Oklahoma, and a number of other states combine grant and formula funds earmarked for the reduction of unemployment in an attempt to maximize the job creation benefits to be derived. New Jersey, for example, in a 1974 governor's report,[1] identifed a number of federal, state and local resources used for meeting employment and training needs in the state. By inventorying and coordinating these resources, New Jersey was able to take a giant step forward in orchestrating a comprehensive industry recruitment and job creation effort.

They did not stop, however, with just identifying the dollars available. They analyzed the role of various state agencies in employment and training, cited the enabling legislation, funding patterns, etc., and noted ways in which collaboration among these agencies could optimize the achievement of the state's overall employment objectives.

South Carolina's TEC program, mentioned earlier,[2] used federal vocational education monies for start-up of its job creation program and later on used CETA funds to compensate qualified trainees enrolled in it. This strategy not only increased their flexibility in responding to employer training needs but helped them to place a sizable portion of their CETA sponsored trainees in private sector jobs once they had completed training.

Wage subsidies and targeted jobs tax credits are being used to offset the cost to employers participating in cooperative education and OJT programs. Targeted jobs tax credits appeal to larger employers; wage subsidies to the smaller employer. Both help to offset the cost of low productivity and high turnover of trainees during the early stages of OJT.

Other input variables which have been found to be of particular importance in facilitating effective job creation programs are business climate, characteristics of potential employees, and the economic development potential of a given area (for a more complete treatment of this concept, see Chapter III). Putting aside for the moment the last of these three functional elements, assessing the business climate and inventorying the skills and career interests of potential employees are clearly activities in which vocational educators can engage.

While the term can be ambiguous, "business climate" is generally understood to reflect the attitudes of government officials, the public, and labor union representatives toward private enterprise. A recent Monthly Labor Review article[3] attributes the rapid growth of new jobs in the South and West over the last 10 years partly to the belief on the part of industry executives that these areas offer a better business climate. The article summarizes a 1975 survey by a vocational consulting firm that sought to assess the business climate in 48 states. "States with low taxes, low levels of public assistance, restrictive labor legislation and a low level of government debt had low scores indicating more favorable environments."[4]

Until recently, Minnesota was viewed by businessmen as a place where the state legislature was insensitive to business needs. A new, aggressive economic development effort complete with full-page ads in the Wall Street Journal was undertaken with the intent of shoring up that image. The staff at Minnesota's Economic Development Commission feel they have successfully turned around a

potentially damaging situation. Now they report a growing number of firms indicating an interest in moving into or expanding their business activities in Minnesota. Part of this resurgence can be attributed to a "New Jobs" initiative launched four years ago with the active leadership of the state's Division of Vocational Education and the backing and support of the state legislature.

Offering relief from various state taxes, contrary to the conventional view, was not found to be an effective way of attracting industry. While such a strategy continues to be a practice in many southern states, researchers have concluded that the loss of tax revenues is an unnecessary burden for a state to assume.[5] Other factors (not included in the Fantus report cited above) found to be important in a New York State survey of business firms[6] were the supply and productivity of labor, wage levels, access to raw materials (or transportation), and ease of access to local markets.

A business firm's decision to locate a plant or expand its employment depends on political factors as well; strong interest on the part of key state government officials, such as the governor, does contribute significantly to a state's image regarding private industry. When the governor is an active proponent of economic development, such as Governor Riley of South Carolina, that image contributes favorably to the state's business climate.

Labor, in most companies, is often the single most important factor in the cost of production. When a business or industry is not tied to a particular geographical area because of its consumer market or the availability of raw materials, then the characteristics of the labor force takes on even greater importance. And, as has been argued throughout this report, customized training services made available through local vocational training facilities are viewed by many employers as positive factors to be weighed in locational decisions. A study sponsored by the Appalachian Regional Commission (ARC) found that 81% of the

employers in the communities sampled were of the opinion that vocational schools were an assest to the local community.[7] The study concluded that ARC's investment in vocational education had paid off both in helping workers to be trained and in finding employment.

Turning our attention to the economic development potential of a state or region, industry decisions regarding plant location and/or job expansion are influenced by the availability of vocational training facilities and programs.

There have been few studies sponsored by other federal agencies on the effects of vocational education on vocational decisions. One small-scale effort, sponsored by EDA and conducted by the Lazar Institute[8] discovered that those skill centers funded by PWEDA who contracted with public schools for certain vocational services were more successful in helping local communities attract new companies or expand existing ones than those who did not.

A survey conducted in 1972 by the Bureau of the Census[9] reinforces this finding. By surveying almost 3,000 firms, the Census Bureau sought to identify various community and plant site characteristics that influence a firm's decision to move or expand. Five-digit SIC codes were used to classify firms by product lines. While no summary analysis of the survey results was provided, high technology firms, e.g., manufacturers of microcircuit components and industrial instruments, rated the presence of vocational training facilities as a "significant" factor in their locational decision.

Process Variables

Shifting our attention from the concern with input variables, a number of recent studies have underscored the importance of those factors which contribute to the delivery of job creation program services in response to employer and community needs. The freedom of the industrial services coordinator to negotiate training arrangements and to commit resources without the approval of higher

state officials is one such factor. The capability and number of vocational education personnel directly involved in job creation activities also contribute to the appeal and responsiveness of a program to employer requirements. Well established communication links with the private sector, local Chambers of Commerce, National Alliance of Businessmen groups, CETA Prime Sponsors, and other community agencies and target group representatives helps to insure sensitivity to employer and trainee needs. The availability of appropriate training equipment and the proximity of training space to a new plant also contribute to effectiveness. Adequate publicity and an energetic outreach effort can spell the difference between success and failure. Examples of each of these strategies follow. Where possible, they have been drawn from on-going programs to dramatize or illustrate how these procedures have been put into practice.

1. Staffing of the Job Creation Effort. The assignment of qualified vocational education coordinators, curriculum planners, and trainers to the job creation program differentiate the better programs from the less ambitious. Few can compete with programs where adequately financed and experienced personnel are assigned. One of the best examples is Oklahoma's State Department of Vocational and Technical Education which added a cadre of regional coordinators to the vocational education staff in order to more systematically and periodically survey training and manpower needs of existing companies in the state. An Industrial and Technical Services (ITS) Division was set up at the state level to perform part of the "seek and find" mission in coordination with the state's Industrial Development Department. The ITS training coordinator works closely with all appropriate state-level agencies and draws on the vocational-technical education resources state-wide when developing training programs tailored to the specific needs of a company.[10]

2. Community Links. Closely associated with the availability of experienced personnel is the degree of first hand awareness on the part of the staff of employer and trainee needs. Effective linkage at the local level can simply mean representation on local economic development teams, industry-education-labor councils, prime sponsor planning councils, private industry councils, etc. Lecht and Matland found that when private industry representatives were not in the majority on planning councils, the likelihood of CETA graduates being placed in private sector jobs was reduced.[11] Where over half of the membership of the planning council was made up of representatives of state and local government agencies together with community organizations, such organizations were more concerned with serving their own interests than with meeting the needs of private employers.

Effective communication links into the community serves other functions than representation on planning and community action councils. Among the other services or functions to be performed by a vocational education "linking agent" are:

a. establishing a helping relationship with potential clients;

b. diagnosing client training needs;

c. locating appropriate training facilities, equipment and materials;

d. working with the training staff to adapt, modify and develop the necessary support materials and curriculum;

e. identify state and local resources and decision makers who should be involved in job creation efforts; and

f. conducting and interpreting labor market surveys to better meet client needs in an appropriate time frame.

The "linking agent" functions to be peformed by job creation coordinators will also tend to change the flow and use of informaton. The leadership skills that such people must have determines how effective they are at establishing solid and open

communication links. Customized industrial training services involving an array of actors in planning and delivering job creation services not only helps to insure interest in and responsiveness to the short-term training needs of industry in Georgia but to the longer-term employee development requirements as well.

3. Equipment and Materials. The availability of up-to-date materials and equipment for use in industry services training programs is also important. Do the tools and machines utilized in the program match those to be used on the job? Will temporary facilities be needed to house a training program geared to an incoming firm? Can equipment and facilities purchased for one program be adapted for use in other programs? The flexibility of the interior space of a training site and its proximity to a plant are also important considerations. Oklahoma has marshalled a state controlled pool of training equipment for use in local programs on short notice. This equipment is used to supplement training equipment available in the local area vocational schools.[12]

One of the advantages of tying classroom training with on-the-job training is the assurance that prospective employees will be able to become familiar with both the work setting and the equipment in use. Rapid advances in technology such as in the word-processing field makes it difficult for vocational schools to stay abreast. Supplementing the development of entry-level job skills with exposure to a related workplace environment helps to insure relevance of the training experience and the ultimate transferability of skills from the classroom to the job.

4. Minimal Prerequisites for Participation. Another feature closely associated with successful job creation programs is the absence of "red tape" governing arrangements worked out with industry for specialized training services. The absence of screening criteria, minimal wage requirements, or prior union approval helps to insure that a program can be set in motion without undue delays.

Avoiding such requirements will contribute to the ease of decision-making receptivity on the part of potential clients.

5. Streamlined Decision Making. Closely allied with the need to keep bureaucratic requirements and "red tape" to a minimum is the need for delegating to those responsible for designing and implementing job creation programs, broad decision making powers for committing state or local resources in a timely manner. By avoiding the lengthy delays often necessitated by the review of decisions up-the-line, the training coordinator can establish training programs that not only fit the needs of a particular company but usually can do so in the required time frame.

6. Curriculum Adaptability. Established vocational education courses and methods of instruction run the risk of not keeping pace with changes in equipment or job skill requirements. Employer representatives need to be involved in an advisory capacity and instructors must be willing to monitor changing job skill requirements associated with their area of specializaiton if obsolescence is to be avoided. Curriculum planners must be wired into the communication network if they are to perform their role effectively.

7. Energetic Outreach. By proper packaging techniques and publicity through brochures and other media, states and communities are much more likely to reach prospective clients than those who fail to provide adequate publicity. Testimonials solicited from industries previously involved often help to persuade potential clients that particular job creation programs have much to offer. State level economic development teams are often the first to make contact with industry officials. If training is one of the persuasive arguments to be used, these teams will be able to make good use of information describing the nature and extent of the training services to be made available. Brochures or hand-out materials which describe, in a straight forward fashion, the steps involved (using pictures where possible and citing potential cost savings) can be effective tools in the hands of experienced promoters.

The Hampton County Manpower Consortium - Springfield, Massachusetts, CETA Prime Sponsor - decided it needed closer ties with private employers. With help from the local Chamber of Commerce (made possible through a CETA contract), Hampton County's "Jobs Program" succeeded in selling itself to local employers by means of staff member visits to individual employers, Chamber prepared publications and pamphlets, and streamlined methods for speedily responding to industry training needs.[13]

This recital of key process variables necessarily neglects a number of other more conventional practices which represent the common denominator of services found in most job creation programs. Their absence in this listing of key elements is not meant to convey that they are nonetheless important. Our concern with highlighting vocational education's role in differentiating between the more and the less successful programs led us to select the elements described.

Output Variables

A number of economic and social indicators have been used as evidence of the success of job creation programs. Oklahoma cites with pride the state's industrial growth between 1968 and 1978.[14] The program served 243 companies in 99 communities and has trained over 23,000 persons with an 84% completion rate. Forty-eight percent of the graduates were women. The average training cost per trainee was $119.

South Carolina's TEC program is credited with helping to bring more than $11 billion in new capital investment into the state over the past 20 years.[15] In 1977-78 alone, over 61,000 South Carolinians participated in special school training programs geared to meet the needs of 504 new or expanding companies.[16] Georgia's "Quick Start" program has led state officials to estimate that the payback of expended funds through taxes on new payrolls alone takes less than two years.[17]

While none of these states can say with certitude that their investment in and support for job creation programs contributed directly to an improved employment picture, the correlation between active pursuit and support for new or expanding industries and the creation of new jobs or the maintenance of old ones seems to be high. Data such as that just cited can contribute to a better understanding of the immediate and longer term prospects of job creation efforts. How and what evidence to collect is the key question to be addressed under this category of essential job creation elements.

Lists of companies served and numbers of trainees placed in jobs represent one set of basic data. Information on income levels and average trainee costs provide an opportunity to compute cost/effectiveness ratios. Payback of expended funds based on new payroll taxes can also be estimated. Each of these measures requires a well developed trainee followup and information retrieval capability.

At a less quantitative level, testimonials from key employers and industry representatives are useful. Awareness of job creation efforts can also be assessed through use of survey instruments and opinion sampling techniques. The timeliness and the utility of vocational training programs can be ascertained through the use of followup questionnaires, soliciting "user" perceptions.

A third set of data can be obtained from the trainees themselves. Income, records of job stability and advancement, and feelings about the value of the training received — all represent measures whihc can provide planners and program coordinators with helpful feedback.

Note that these various indicators are applicable at different stages in the unfolding of the job creation effort. Immediate outcome measures are more likely to be concerned with the attitudes of trainees and potential employers toward the job creation effort. Economic measures can only be applied after a program has been in operation for a period of time. Ultimate outcomes are, of course,

concerned with whether, in fact, employment opportunities and economic benefits do grow.

One caveat is in order at this point. Most of the literature on economic development programs identify and describe the role of various economic factors which contribute to the overall success of a job creation program. The contribution of vocational education to that effort is recognized but often inferentially.[18] Therefore, it is incumbent upon program developers to devise sets of measures which not only serve to communicate to prospective clients the advantages of vocational training but will enable those involved in program design to assess how well that design functions in reality. It is only through the careful monitoring and feedback of results that appropriate adjustments and improvements in job creation programs can be brought about. Planners and evaluators will want to ask themselves the following types of questions:

1. Are the criteria formulated to measure job creation activities of sufficient scope to encompass the range of training services provided? Are OJT programs, for example, sufficiently differentiated from vestibule training so that criteria appropriate to each area included in the set of standards?

2. Are the standards themselves sufficiently operationalized to insure uniform interpretation by project staff?

3. Have both users and deliverers been involved in the decision making process on evaluation?

4. Are the data gathering methods clear and unambiguous so that the findings are both reliable and valid?

5. Is the feedback strategy such that practitioners and planners can make effective use of the information made available?

Answers to issues such as these can help to insure the overall utility of the outcome assessment effort.

It is worth reminding ourselves at this point that the success or failure of a job creation program does not rest solely on the availability and responsiveness of the vocational education community to employer needs. Economic factors, the

quality of community schools, a community's crime rate, the quality of its fire and police protection -- all contribute to the appeal that one community has over another. Sometimes it simply boils down to the fact that a particular company executive prefers to live in a given location in spite of the incentives and arguments marshalled to attract him elsewhere. However, monitoring and reporting hard data on the role that local vocational education programs do play in attracting or helping private industry expand should contribute to more rational decisions leading to the continued support of a local job creation undertaking.

NOTES

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CHAPTER V

VOCATIONAL EDUCATION'S ROLE IN JOB CREATION IN THE 80's

The United States is on the threshold of what may be appropriately described as the "slow growth '80's". According to Lecht, we are entering a decade of lower economic growth, with the job-seeking and underemployed young adults of the 1970's becoming the employable, more productive citizens of the 1980's.[1] Such a shift reflects the move, in a few short years, of our population gravity center from early adulthood to middle adulthood. It will also be a decade characterized by shrinking college enrollments, declining numbers of young adults, and improved employment for minorities and disadvantaged groups.[2]

The number of young adults in the 14 to 24 year old age bracket will decline by 2.7 million between 1977 and 1990 while those in the 25 to 54 age bracket, the aging post-war baby boom generation, will grow by 22.8 million, a rise of 30%. By 1985, there wil be 74 million adults in this age bracket occupying jobs and by 1990 that figure will swell to 83.5 million.[3]

For the first time in six years, the actual number of youth in the 16 to 19 age bracket has begun to decline. Those in their teens are enjoying a better employment market than their older brothers and sisters who are riding the tail end of the post-World War II baby crop. Competition for jobs will continue to be tight for those in their prime working years.

To meet the needs for jobs during the next decade, our labor force must grow by 1.5 million employees a year (as contrasted with a 2.3 million average annual rate of growth during the 70's).[4] Depending on which growth scenario one wishes to adopt, it will be more difficult to increase the rate of growth in employment opporutnities given our current concerns with energy shortages, environmental pollution, and runaway inflation. While 60% of the occupations opening up in this decade will be in white-collar fields (continuing the trend

established in the late 60's and 70's), a significant number of new jobs will also become available in high capital intensive industries. Such firms will require in excess of $100 billion a year in investment capital at 1976 prices if their pace of expansion is to be maintained.[5] This voracious appetite for capital is exacerbated by the cooling off of investor interest as inflation's spiral has taken its toll. After correcting for inflation, the return on equity investment has declined significantly in recent years.

The tie between inflation and the investor's willingness to assist industry in modernizing or expanding its production capacity is a complex one. Given an uncertain economy and an unstable international picture, investors are reluctant to make capital available. Inflation also adds to the cost of replacing plants and equipment, thus new capital has to be added just to replace obsolete or worn out facilities.

The growing concern over the availability of new capital and the need for improvements in productivity did lead to the 1978 Revenue Act which reduced the tax on corporate income and capital gains and brought about an expansion of the use of investment tax credit. Additional changes in corporate taxes, e.g., accelerated depreciation schedules, should occur in the early 1980's, further benefiting the business investor.[6] With the adoption of government policies of this type, inflationary pressures should slacken and create a more favorable climate for business investment.

Should the government succeed in reducing the rate of inflation in the early 1930's, expanded business investment will serve as a critical stimulus of new or expanded jobs. Many job openings, however, will be the result of attrition.[7] Keeping an established company operating will be as important as opening up new ones.

The annual increase in Gross National Product (GNP) should average 2.7% during the 1980's as contrasted with 2.5% in the 70's. With projected labor shortages in selected employment categories, e.g., nurses and chemists, adoption of automated monitoring and production equipment may accelerate.

There is the distinct possibility that the 1980's will lead to a changed viewpoint on the part of workers towards their jobs. Since fewer new workers will be entering the labor force during the 1980's and an increasing proportion will fall into the 25 to 54 age bracket, there could well be a plateauing of career advancement opportunities among the more experienced workers who would ordinarily expect to move up to middle-level managerial or skilled worker positions during the decade.

This mid-level career crunch will coincide with important changes in household and family characteristics. We have already experienced a consistent trend toward at least two wage earners in a household; that trend will continue in the 1980's. The number of families with more than one worker rose from 43% in 1960 to 62% in 1978.[9]

This potential shortage of certain categories of skilled workers available in the labor force, e.g., machine tool operators, will motivate employers to seek out ways of introducing greater flexibility into work schedules and broader decision making responsibilities into rank and file jobs in order to attract these types of workers to their places of business. Thus, it is very likely that we will find that flex-time scheduling, dual work assignments, part-time work and job enrichment will result.[10]

Assuming then, that the national economy will grow at a somewhat slower rate during the 1980's than it did in the 70's, the Bureau of Labor Statistics projects a reasonably bright future for people with the right skills who live in the right communities. The employment of women, for example, will continue its dramatic

rise. Midclass blacks are expected to move toward parity with whites in employment by 1990. This represents a sharp turn around when compared with their employment status during the last decade.

Projected employment opportunities by region indicate that job openings are likely to be most plentiful in those areas where either the environment offers certain living advantages[11] or the Federal government's purchases and programs support the flow of federal dollars into that region.[12] Those regions that do grow will experience an increase in political and economic power as well. The 1980 Census results will have a dramatic impact on the distribution of Congressional representative and federally controlled economic development funds.

Today's migrants are likely to be younger people with high educational attainment levels, people looking for work, and families searching for a better living enrichment. Fifty-nine percent of all migrants tracked during the period 1974 to 1976 gave job-related factors as their primary reason for moving.[13]

Looked at from the perspective of the four regions of the United States, structural unemployment in the northeast and northcentral regions[14] will continue to be a problem during the 1980's. The southern and western states will sustain the growth that they have enjoyed during the last 10 years, due in part to industry's tendency to migrate to regions where organized labor has a limited influence and where wages are low and government contracts are plentiful. The aggressive recruitment programs described in earlier chapters will continue, giving selected states an edge over other states. In summary, those states with warm climates, a favorable mix of industries, good labor relations, a cadre of skilled workers, and profitable government contracts should continue to grow and prosper economically.

Implications for Future Job Creation Programs

Statewide job creation and economic development programs are likely to persist as a single operating agency at the state level, but with a continuing emphasis on coordination with other agencies through the governor's office by such means as budgeting processes, regulatory and licensing functions, policy planning and the appointment of inter-agency coordinating committees. Continuation of federal grants for state economic development planning will enable state planning authorities to continue to integrate transportation, housing and human resource development activities with the objective of optimizing a state's economic, social and physical development.[15]

Given the increased emphasis on mandated inter-agency coordination at the state level, certain implications for vocational educaton's role in job creation programs emerge. First, there is likely to be lower per capita expenditures for vocational education in the 80's. More attention will need to be given to ways of sharing training costs with private industry or through tuition charges. Vocational education programs at the post-secondary level should grow faster than at the secondary level partly because of the large number of adults who will seek additional or new marketable skills and partly because post-secondary institutions can defray the added cost of education through tuition charges, charges to industry for short-term training services, alumni support and other sources of financial support.

Second, vocational institutions at both the secondary and post-secondary levels must accept new education and training assignments. Inculcating values and attitudes associated with raising the individual worker's desire to shape his or her own job (flexible working hours, production methods, budget allocations) should be one area of emphasis.[16] Aggressive out-reach efforts in coordination with a state

or community's job creation program should be another. Additional training support for small business operators should be another.

Third, help for minorities and women attempting to qualify for "non-traditional" and "traditional" work roles should continue to expand. Adult women not in the labor force who seek entry or re-entry will turn to vocational education in increasing numbers for help. Such help should encompass career orientation as well as a broad array of specialized vocational courses. Reimbursement of relocation costs may also be needed.

Fourth, bi-lingual students and other disadvantaged students will be turning in greater numbers to secondary and post-secondary vocational education programs for job skill development. Inner city youth and high school dropouts, being assured of employment if they can acquire basic literacy and job skills, will find vocational training more appealing, assuming that the institutions continue to adapt to their requirements.

Fifth, because the 80's could well be a boom period for new technologies (new computer applications, wide utilization of microprocessors, dramatic developments in word-processing) the need to upgrade many occupations will place an increased burden on vocational education. This invention of new technologies will create myriad opportunities for vocational education programs at all levels if program directors are sensitive to the pact and magnitude of shifts in employment opportunities resulting from the attrition of older workers and new job creation. Maintenance of close ties with industry, particularly smaller, high technology firms, should be stressed.

Sixth, business are likely to become even more strongly interested in vocational programs and students. As young labor market recruits become harder to find and as sophisticated new technologies offer more efficient ways of accomplishing certain tasks, we should expect a substantial increase in on-the-job

training with vocational educator involvement. Cooperative education programs, customized industrial training programs and basic skill development programs, worked in collaboration with other job creation projects, will be in even greater demand.

Vocational courses and curriculum adjustments will need to reflect changing technological needs; increased sensitivity to changing age, sex, and ethnic composition of the vocational education population; more part-time participants; and more training designed for disadvantaged groups. The most important curriculum change may well result from the growing cooperation between business and the vocational education establishment -- where businesses are willing to make facilities, equipment, and monetary resources more available for vocational education purposes.

Summary

Recognizing the range of regional variability of these projected developments, no single model of job creation support effort will adequately guide today's practitioners in their attempts to accommodate these shifting requirements. An expanded job creation program requires leadership, a willingness to take risks, and appropriate guidelines. AVA's Economic Development Project proposes to offer such services. However, practitioners of the art will be the ultimate determiners of vocational education's success or failure in the creation or development of jobs during the "slow-growth" 80's.

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APPENDIX A

LIST OF KEY INFORMANTS

1. Michael Barker, Associate Director, Council of State Planning Agencies, Washington, D. C.

2. Samuel Barrett, Assistant Superintendent and State Director of Vocational Education, Sacramento, California.

3. Paul Barton, National Manpower Institute, Washington, D. C.

4. Paul Braden, Economic Development Administration, U. S. Department of Commerce, Washington, D. C.

5. David Breneman, Senior Fellow with Economic Studies, The Brookings Institution, Washington, D. C.

6. Denise Brown, Community Economic Development Unit of California State Office of Economic Opportunity, Sacramento, California.

7. Lee Bruno, Project Director, CSR, Inc., Washington, D. C.

8. Wallace Burke, Deputy Assistant Commissioner of Vocational Education, Nashville, Tennessee.

9. Pat Choate, Academy for Contemporary Problems, Washington, D. C.

10. Wes Cochrane, Assistant Commissioner, Economic Development Administration, St. Paul, Minnesota.

11. Gerald Cresci, California State Department of Higher Education, Sacramento, California.

12. Henry David, Director, Vocational Education Study, National Institute of Education, Washington, D. C.

13. Richard Dempsey, National Occupational Information Coordinating Council, Washington, D. C.

14. Ed Denison, Associate Director for National Economic Accounts, U. S. Department of Commerce, Washington, D. C.

15. Russell Flanders, National Occupational Information Coordinating Council, Washington, D. C.

16. Kevin Fry, Information Specialist, American Federation of Labor/Congress of Industrial Organizations, Washington, D. C.

17. Waymond Gross, Assistant Director for Economic and Community Development, Nashville, Tennessee.

18. Madeline Hemmings, Associate Director of Human Resources, Chamber of Commerce of USA, Washington, D. C.

19. William Hill, Executive Director, International Downtown Executives Association, Washington, D. C.

20. Ben Hurst, Training Director for Economic and Community Development, Nashville, Tennessee.

21. Claude Imagnin, National Education Association, Washington, D. C.

22. Howard Kasmey, State Commissioner of Education, St. Paul, Minnesota

23. Bill Koche, Director of Linkages Division, Nashville, Tennessee.

24. Robert Krupp, Program Director and CETA Prime Sponsor, Nashville, Tennessee.

25. Paul Lambert, Staff Director of Balance of State CETA, Nashville, Tennessee.

26. John Leeman, Assistant Commissioner of Vocational Education, Nashville, Tennessee.

27. Sar Levitan, Director, Center for Social Policy Studies, George Washington University, Washington, D. C.

28. Paul London, Conference of North-Eastern Governors, Nashville, Tennessee.

29. Howard Matthews, Acting Director of Post-Secondary Occupational Planning, U. S. Department of Education, Washington, D C.

30. David McCullough, State Department of Vocational Education, St. Paul, Minnesota.

31. Janet Pease, Policy Analyst, Economic Development Administration, U. S. Department of Commerce, Washington, D C.

32. Carl Peroit, Deputy Director, Employment Development Department, Sacramento, California.

33. Ed Persons, University of Minnesota, Minneapolis, Minnesota.

34. Gloria Rose, California Industry-Education Council, Sacramento, California.

35. Neal Rosenthal, Bureau of Labor Statistics, Washington, D C.

36. Gene Soffer, Conference of North-Eastern Governors, Nashville, Tennessee.

37. Bob Sparks, State Development Association, Annapolis, Maryland.

38. Dee Wilder, Director of Research, Coordinating Unit, Nashville, Tennessee.

39. Joan Wills, Director of Employment and Vocational Training, National Governors' Association, Washington, D. C.

40. Alice Ann Wohlbruck, Executive Director, National Association of Development Organizations, Washington, D. C.